

## ABSTRACT OF THE DISCLOSURE

Without performing a channel reservation, an arbitrary radio  
5 communication with other surrounding radio communication devices may  
be carried out by setting up a receiving slot according to the amount of  
receiving data. Each radio communication device may only manage the  
number of its own receiving slots so as to secure the channel required for  
communication by its own determination, without needing a process  
10 which is accurately synchronous with other radio communication devices.  
The radio communication device on the data transmission side monitors,  
by receiving the beacon, the increase in the number of the receiving slots  
of the radio communication device on the reception side, so as to transmit  
the data immediately when the number of the receiving slots increases.  
15 The reception acknowledgement (ACK) information from the reception  
side radio communication device is written in the beacon and returned.